FLUID CONTROLS

HYD-AIR®

GAS VALVES & INSTRUMENTATION PRODUCTS FOR POWER
OUR COMPANY

Established in 1974 by Dr. Y.E. Mochhala, a Ph.D in Mechanical Engineering from Northwestern University, USA, Fluid Controls® is a leading provider of instrumentation products and services for a wide variety of industrial applications. Headquartered in Mumbai, the group has manufacturing facilities in Pune and Goa, including a state-of-the-art R&D centre and testing laboratory.

RESEARCH & DEVELOPMENT

Fluid Controls® offers clients customized solutions based on analytical formulations, 2D and 3D Modelling And Finite Element Analysis. Our commitment to product upgradation and new product development has resulted in the recognition of Fluid Controls® as an “R&D Centre” by the Department of Scientific & Industrial Research (DSIR).

CERTIFICATIONS

- ISO 9001 : 2015
- PED
- ISO 14001
- OHSAS ISO 18001
- ASTM F1387-99 (2012)
- ISO 19879 / ISO 8434
- MSS-SP-99
- Fire Safe API 607 / ISO 10497
- Fugitive Emission Testing
- ISO 15500 / NGV / ECE R110

CLIENTS AND APPROVALS

- Andhra Pradesh Power Generation Corp (APGENCO)
- Aravali Power Company Private Limited
- Bharat Heavy Electricals Limited (Hardwar, Bhopal, Bangalore, Hyderabad, Trichy, New Delhi)
- Coastal Gujrat Power Limited
- Damodar Valley Corporation
- Jindal Power & Steel Limited
- Karnataka Power Corporation Limited
- Madhya Pradesh State Electricity Board
- MAHAGENCO
- National Thermal Power Corporation
- Tata Power Company Limited
- West Bengal Power Development Corporation
SPECIALITY PRODUCTS FOR THE POWER INDUSTRY

Fluid Controls® offers a complete range of HYD-AIR® brand specially designed and manufactured valves for steam and gas turbine applications.

Besides the valves and manifolds used in instrumentation of turbo generator sets there are special valves up to NB150 for the following applications:
- Hydrogen cooling system of turbo generator
- Valve for the super heated steam line including special manifolds
- Valves for heat exchangers in condensate lines
- Valves used for cooling towers

All these items conform to the specifications laid down for higher megawatt turbo generator sets.

For lower megawatt turbo generator sets, Fluid Controls® offers
- Double ferrule fittings
- Manifolds Valves
- Hydraulic Fittings
- Pipe Clamps & Flanges
- Condensate Pots

OEM, SPARE AND PROJECT SUPPLIES

**OEM SUPPLIES:**
Valves for Steam / Gas Turbines to BHEL and turbine manufacturers

**MRO REQUIREMENTS:**
Gas Valves to NTPC / State Power Generation Companies / State Electricity Boards

**NTPC PROJECTS:**
Instrumentation hardware packages of Gas Valves, Instrumentation Fittings, Instrumentation valves, manifolds, air headers, condensate pots for NTPC projects

**PRIVATE POWER PLANTS:**
Gas Valves, Turbine Valves, Instrumentation hardware and Valve Spares

ENGINEERED TO THE HIGHEST TECHNICAL STANDARDS

Our innovation and process-focused team constantly challenges our existing product portfolio. The team develops new products and upgrades existing products to benefit our customers.

We use the concept of “Design for Six Sigma” as a platform for product development and follow a well laid out procedure for all our developments.

Our expert Techno-Commercial team always keeps the end user in mind and works closely with clients to design customised products and solutions.
GAS VALVES

VALVES FOR GAS MEDIUM

Valves for Gas Service and High Pressure Gas Service in stainless steel and forged steel for Air, H2, CO2, N2 Etc.

VALVES FOR TURBINE OIL AND LIQUID

Valves for pressure gauge lines, drainage, fine regulation in pipe lines, throttling and for use with DP transmitters. Media for these valves are turbine oil, clarified & demineralised water & other non-aggressive fluids.

VALVES FOR STEAM TURBINE (OIL, STEAM, WATER)

Valves for turbine integral systems handling hot condensate, super headed steam, Air steam mixture, steam water mixture, oil & oil vapours, and fire resistance fluid & its vapours. These valves are used in pressure gauge lines, and as stop valves in the impulse lines of pressure instruments connected to high pressure & high temperature steam pipe lines.

The products above do not represent the entire Hyd-Air® product range. For details please contact us at sales@fluidcontrols.com
GAS VALVES

VALVES FOR PRESSURE AND VACUUM APPLICATIONS (HEAT EXCHANGERS)

Valves for non-corrosive, no-aggressive media such as water, oil, gas and steam for pressure & vacuum application

INSTRUMENTATION VALVES

Valves for instrumentation lines used for draining and for connection between the impulse lines and the pressure / differential pressure measuring instruments. Also includes a range of condensate pots for isolating foreign matter from the system.

The products above do not represent the entire Hyd-Air® product range. For details please contact us at sales@fluidcontrols.com
NEEDLE VALVES

- A wide variety of designs including two-way, three-way, multi-port, block & bleed
- Specially designed, adapted and certified low temperature valves offering safe, efficient service for temperatures to -196°C (-320°F)
- Needle Valve PDA by American Bureau of Shipping (ABS). Certified MSS-SP-99, Fugitive Emission Certification as per API 622 / ISO 15848
- Certified for CNG applications (NGV 3.1, ECE R110, ISO 15500)
- IBR certification offered
- Working pressures up to 15,000 psig (1034 bar)
- Case hardened non-rotating swiveling plug or ball and thread above the seal design
- End connections and valve material to customer requirements
- Heat code traceability

BALL VALVES

- Standard Two, Three and Four-Way designs
- Switching service ball valves offered in a compact design
- PDA by American Bureau of Shipping (ABS). Fire Safe Certification as per API 807 / ISO 10497
- Certified for CNG applications (NGV 3.1, ECE R110, ISO 15500)
- Special range of flanged end ball valves offered for hydraulic service
- Working pressures up to 10,000 psig (689 bar)
- End connections and material to customer requirements
- Heat code traceability

GLOBE VALVES

- Union Bonnet and OS&Y designs
- OS&Y valves offered up to Class 4500
- Working pressures as per ANSI 16.34
- End connections and valve material to customer requirements
- Heat code traceability
INSTRUMENTATION PRODUCTS

NON-RETURN VALVES
- Valve PDA by American Bureau of Shipping (ABS)
- Offered a variety of designs with screwed and tube end connections
- Standard cracking pressure 0.3-0.5 kg/cm²
- Cracking pressure up to 2kg/cm² offered for special applications
- Working pressures up to 6,000psig (414 bar)
- Valve materials to customer requirements
- Heat code traceability

AIR DISTRIBUTION MANIFOLDS
- Designed as per ASME Sec VIII, Div I
- Configurations customized to client requirements
- Flanged, tube and screwed end connections offered
- A variety of mounting arrangements offered
- Radiography offered on all weld joints
- Heat code traceability

CONDENSATE POTS
- Designed in accordance with ASME Sec VIII, Div I
- Socket Weld, Butt Weld, NPT end connections
- Standard pipe sizes 2" to 8" and schedules 40, 80, 160, XX
- Radiography offered on all weld joints
- Material to customer requirements
- Heat code traceability

PIPE AND TUBE CLAMPS
- Standard Duty construction as per DIN 3015 - 1 up to 2 1/2" or 63 mm OD
- Heavy duty construction as per DIN 3015 - 2 up to 8" or 219mm OD
- A special range of twin clamps as per DIN 3015 - 3 up to 42mm OD
- Available in polypropylene, polyamide and aluminum with CS/SS metallic parts
- Channel mounting options available